

Report to Congressional Committees

May 1994

# CONTINENTAL AIR DERENSE

A Dedicated Force Is No Longer Needed



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Personal Author: Herley, J.; Payne, R.G.; Marsh, F.R.; et al.

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United States General Accounting Office Washington, D.C. 20548

National Security and International Affairs Division

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May 3, 1994

The Honorable Sam Nunn Chairman, Committee on Armed Services United States Senate

The Honorable Daniel K. Inouye Chairman, Subcommittee on Defense Committee on Appropriations United States Senate

The Honorable Ronald V. Dellums Chairman, Committee on Armed Services House of Representatives

The Honorable John P. Murtha Chairman, Subcommittee on Defense Committee on Appropriations House of Representatives

In February 1993, the Chairman of the Joint Chiefs of Staff recommended that (1) the continental air defense mission be performed by dual tasking existing active and reserve general-purpose fighter and training squadrons in the Air Force, the Navy, and the Marine Corps and (2) the number of Air National Guard units dedicated to this mission be sharply reduced or eliminated. As part of our legislative responsibility, we assessed the viability of the Chairman's recommendations and the Secretary of Defense's and the Air Force's responses to those recommendations. We are reporting to you because of your committees' jurisdiction over these issues.

## Background

The continental air defense mission evolved during the Cold War to detect and intercept Soviet bombers attacking North America via the North Pole. The continental air defense force that carries out that mission is within the North American Aerospace Defense Command (NORAD), which is a joint U.S. and Canadian command. The U.S. portion of that force is currently comprised of 180 Air National Guard F-15A/B and F-16A/B aircraft located in 10 units and 14 alert sites in the United States. In addition to the 10 dedicated units, 2 F-15 dual-tasked general-purpose units stand alert for NORAD—an active unit at Elmendorf, Alaska, and an Air National Guard unit at New Orleans, Louisiana—part of which is on 24-hour alert. Because

it does not have a wartime mission outside North America, the continental air defense force is not counted as part of the Air Force's 26-1/2 fighter wing equivalent base force or the 20 fighter wing equivalent force recently proposed by the Secretary of Defense as a result of the Bottom-Up Review.¹ The Air Force currently budgets about \$370 million annually to operate and support the continental air defense force.

As required by the Goldwater-Nichols Department of Defense Reorganization Act of 1986, the Chairman of the Joint Chiefs of Staff recommended in early 1993 those role and mission changes necessary to achieve maximum effectiveness of the military services. The Chairman determined that the United States no longer needed a large, dedicated air defense force because of the near disappearance of the Soviet threat. Consequently, the Chairman concluded that the dedicated force could be significantly reduced or eliminated and that existing active and reserve general-purpose combat and training forces could be tasked to perform the continental air defense mission. The Chairman expected that his recommendations would result in significant savings in personnel and operating costs. The analysis leading to the Chairman's conclusion and recommendations focused on the forces the United States dedicates to the air defense mission. Likewise, this report discusses the roles and missions of the U.S. forces and does not include any analysis of Canadian forces.

The Secretary of Defense viewed the Chairman's recommendations as a top priority. The Secretary considered the Chairman's recommendations and subsequently directed the Air Force to reduce the force but retain the mission primarily as an Air Force reserve responsibility. In response, the Air Force devised a plan to retain the mission within the Air National Guard as a dedicated force and reduce that force from 180 aircraft to slightly more than 2 fighter wing equivalents, thus accomplishing only a portion of what was envisioned by the Chairman. The plan, while not formally endorsed by the Secretary of Defense, is reflected in the Department's fiscal year 1995 budget submission.

## Results in Brief

A dedicated continental air defense force is no longer needed. Since the threat of a Soviet-style air attack against the United States has largely disappeared, the air defense force has been focusing its activities on air sovereignty missions. Active and reserve general-purpose and training

<sup>&</sup>lt;sup>1</sup>These levels were established as the number of fighter wings needed to support two simultaneous regional conflicts. Each fighter wing has 72 combat aircraft.

<sup>&</sup>lt;sup>2</sup>Roles, Missions, and Functions of the Armed Forces of the United States, February 1993.

forces could perform these missions because they have comparable or more capable aircraft, are located at or near most existing continental air defense bases and alert sites, and have pilots capable of performing air sovereignty missions or being trained to perform such missions.

The Chairman's recommendations recognize the need to reassign air sovereignty missions and eliminate or sharply reduce the force now dedicated to performing those missions to other forces. The Secretary's guidance and the Air Force's plan accomplish only a portion of what was envisioned by the Chairman, as summarized in table 1.

Table 1: Summary of the Chairman's Recommendations, the Secretary's Guidance, and the Air Force's Plan

Chairman, Joint Chiefs of Staff	Secretary of Defense	Air Force
Eliminate/sharply reduce dedicated forces	Reduce dedicated forces	Reduce the number of dedicated aircraft to about two fighter wing equivalents
Dual task other active and reserve general-purpose and training forces	Retain forces largely as a reserve function	Retain forces in the Air National Guard

Full implementation of the Chairman's recommendations would make more operating and support funds available to sustain general-purpose forces during this period of declining budget resources. The Secretary's guidance and the Air Force's plan, however, would allow the Air National Guard to retain an excessive force structure and incur the associated operating and support costs.

## A Dedicated Continental Air Defense Force Is No Longer Needed

The former Soviet Union no longer poses a significant threat of a bomber attack on the continental United States. Further, internal problems within Russia and other former Soviet Union countries have extended the time it would take them to return to previous levels of military readiness and capabilities. As a result, dedicated forces the United States once maintained exclusively to counter a Soviet attack now concentrate on air sovereignty missions, such as anti-drug smuggling efforts. The air sovereignty missions could be reassigned to other existing reserve or active general-purpose combat or training units because they (1) have comparable or better aircraft, (2) are located at or near most existing air defense units or alert sites, and (3) have pilots that possess similar skills to those used by air defense and air sovereignty pilots.

#### Activities Have Been Focused on Air Sovereignty Missions

According to the Chairman, the air defense force was structured to intercept the former Soviet Union's long-range bomber force if it attacked over the North Pole. Since that threat has largely disappeared, the United States no longer needs a dedicated continental air defense force, and the force has refocused its activity on the air sovereignty mission, concentrating on intercepting drug smugglers. However, anti-drug smuggling activities at some units and alert sites have been minimal and at others almost nonexistent. Overall, during the past 4 years, NORAD's alert fighters took off to intercept aircraft (referred to as scrambled) 1,518 times, or an average of 15 times per site per year. Of these incidents, the number of suspected drug smuggling aircraft averaged one per site, or less than 7 percent of all of the alert sites' total activity. The remaining activity generally involved visually inspecting unidentified aircraft and assisting aircraft in distress. Appendix I contains additional information on the scramble activity at each air defense unit and alert site and on the continental air defense and air sovereignty missions.

In September 1993, we reported on the justification for the amount of flying hours and steaming days the Department of Defense (DOD) uses in carrying out its drug detection and monitoring role. The report stated that DOD's efforts were part of a multiagency effort and concluded that the government's investment does not appear to be paying off because estimated cocaine flow has not appreciably declined and most drug smugglers are not interdicted.

#### Other Reserve and Active Units Have Comparable or Better Aircraft

General-purpose combat and training forces' aircraft, such as the F-15C, F-16C, F-14A/A+, and F/A-18A/B/C, are capable of performing the air defense and air sovereignty missions. These aircraft are generally newer and equipped with more advanced avionics than the dedicated air defense force's F-16As and F-15As, which are the oldest F-16 and F-15 models in the Air Force's inventory. For example, the more modern F-16Cs and F-15Cs have advanced radars that provide greater range and sharper resolution than those on the F-16A or F-15A. Moreover, the F-15C has undergone a multistage improvement program to enhance other avionics, such as the electronic countermeasure system and the central computer system, which resulted in greater data storage capabilities and enhanced

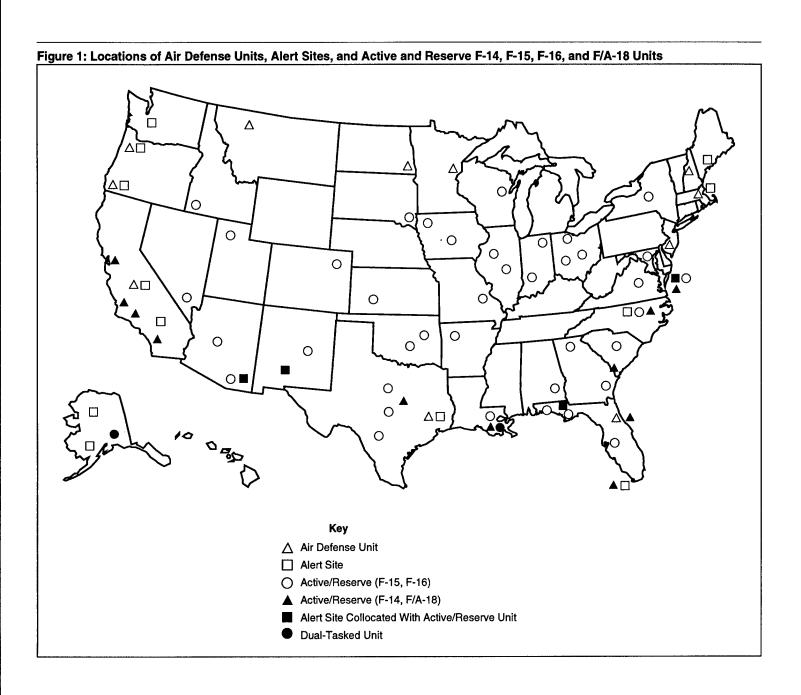
<sup>&</sup>lt;sup>3</sup>These figures relate to all air defense units active during the 4-year period. Over that time, some sites were closed or operations were transferred to other locations.

<sup>&</sup>lt;sup>4</sup>Drug Control: Heavy Investment in Military Surveillance Is Not Paying Off (GAO/NSIAD-93-220, Sept. 1, 1993).

processing speed. In addition, over 500 fighter aircraft have been designated for training purposes.

### Location of Reserve and Active Units Would Allow Them to Carry Out Missions

Current air defense and alert sites are located along U.S. borders to provide geographic coverage. General-purpose and training units in the active and reserve forces, which are located at about 50 bases throughout the United States, could support NORAD's coverage requirements. In addition, several air defense force alert sites are collocated with or close to general-purpose and training units. Therefore, dual-tasked existing general-purpose and training forces would also be able to fulfill the air defense and air sovereignty missions. Figure 1 and appendix II identify the locations of air defense units, alert sites, and general-purpose and training units.



Some general-purpose and training forces might have to deploy to other locations to perform their missions. NORAD currently deploys some air defense force aircraft to other sites to perform their duties instead of dual-tasking collocated or nearby general-purpose units. For example:

- The Air Force deploys F-16s from the 158th Fighter Interceptor Group at Burlington, Vermont, to Langley Air Force Base, Virginia. Langley is the home of the 1st Tactical Fighter Wing, an active unit of 72 F-15Cs—the most technologically advanced fighter in the Air Force—and its pilots are trained in the air-to-air mission, which closely resembles the air defense pilots' training.
- The 148th Fighter Interceptor Group, Duluth, Minnesota, deploys to Tyndall Air Force Base, Florida, home of the 325th Fighter Wing. This wing trains F-15 pilots and has 72 F-15C aircraft.
- The Air Force deploys air defense force F-16As from the 120th Fighter Interceptor Group, Great Falls, Montana, to Davis-Monthan Air Force Base, Tucson, Arizona. Davis-Monthan is the home of the 162nd Tactical Fighter Group, which has 46 F-16 aircraft and pilots trained in the air-to-air mission.

#### Skills for Air Defense and Active and Reserve Pilots Are Comparable

The skills required by pilots in the air defense force are, in several ways, comparable or similar enough to those required by pilots in general-purpose squadrons. For example, both general-purpose and air defense pilots are required to be proficient in skills such as day or night target intercepts, defense of an area, aerial gunnery, and quick takeoffs or intercepts. However, some skills are unique to either general-purpose or air defense pilots. For example, skills needed for composite force training and joint maritime operations are needed by general-purpose units but are not necessary for all air defense force pilots. Likewise, skills such as slow shadow day or night visual identification are needed by air defense and air sovereignty pilots so that they can identify and track unknown aircraft, but these skills are not needed by general-purpose pilots. However, despite the missions' unique pilot requirements, enough training similarities would allow dual-tasked general-purpose squadrons to accomplish the air defense and air sovereignty missions.

## The Chairman's Recommendations Could Save Costs

The Chairman of the Joint Chiefs of Staff's recommendations could result in significant cost savings. If existing general-purpose and training forces were tasked to accomplish the air defense and air sovereignty missions, force structure and associated costs could be reduced. The amount of savings would depend on whether the dedicated air defense units were disbanded or assigned another mission. If all the air defense units were disbanded, the Air Force could save as much as \$370 million in annual operation, maintenance, and personnel costs.

To accomplish the added responsibility, existing active and reserve units may need additional resources, such as aircraft for alert duties. The cost associated with these aircraft could be offset if a corresponding dedicated air defense unit were disbanded. For example, the dual-tasked F-15 general-purpose unit at the Naval Air Station, New Orleans, Louisiana, has 24 combat aircraft instead of the usual 18 aircraft assigned to F-15 units that are not dual tasked. These aircraft cost about \$46 million annually, or about \$6 million more than those in units with 18 aircraft. However, if dual tasking a 24-combat aircraft Air National Guard unit would eliminate a dedicated air defense F-15 unit costing over \$42 million, then over \$36 million would be saved.

## The Air Force's Plan Would Not Achieve Significant Cost Savings

Since the Secretary of Defense's guidance and the Air Force's plan would retain the air defense mission as a largely dedicated Air National Guard responsibility and only reduce the dedicated force structure, significant cost savings would not be achieved. The Air Force estimates that its plan to slightly reduce the dedicated force by retiring some aircraft at each of the 10 Air National Guard units would save about \$36.5 million annually in operations and support costs. Thus, the Air Force would still incur significant personnel, operating, and support costs, since the Air Force would continue to operate and maintain all 10 dedicated NORAD air defense units. The plan, while not formally endorsed by the Secretary of Defense, is reflected in DOD's fiscal year 1995 budget submission.

## Recommendation

We recommend that the Secretary of Defense not approve the Air Force's plan unless it is modified (1) to eliminate or sharply reduce the dedicated air defense force and (2) to reassign the air defense mission to active and reserve general-purpose and training units.

# Agency Comments and Our Evaluation

DOD provided comments on a draft of this report, which appear in appendix III. Although it mostly concurred with the facts discussed in the draft report, DOD took issue with some of the analysis and conclusions drawn from those facts and did not concur with the recommendation. In commenting on the draft report, DOD noted that (1) the Chairman's recommendation was based on an Air Force consisting of 26-1/2 fighter wings, (2) air sovereignty and a capacity to regenerate a continental air defense force remain a critical function of the Air Force, and (3) it has taken steps to appropriately size the available force.

According to Dod, the Bottom-Up Review required the Air Force to maintain forces at a sufficient level to respond to two nearly simultaneous major regional conflicts and that 20 fighter wings would be necessary to meet that requirement. Dod further stated that force requirements for the air sovereignty mission were not included in the level required to meet major regional conflicts. That is, the analysis supporting the Chairman of the Joint Chiefs of Staff's Roles and Missions report was based on the Air Force maintaining 26-1/2 fighter wings. Force structure reductions would result in a decrease to 20 fighter wings. Thus, under the most demanding circumstances in which the Air Force would have to deploy all 20 fighter wings, no forces would be available to fulfill the air sovereignty mission.

DOD agreed that eliminating all dedicated air defense units would result in significant net savings but also noted that some incremental costs would be incurred in dual tasking other units. DOD also commented that a dedicated force capable of performing air sovereignty missions could help deter illegal airborne activity. However, our September 1993 report on drug control efforts noted that the continental air defense force might be ineffective in detecting, monitoring, and apprehending drug smugglers because direct drug-smuggling flights into the United States essentially ended years ago and jet fighter aircraft cannot effectively track slow, low-flying, drug-smuggling planes.

The analysis in the Chairman's Roles and Missions report was clearly based on the threat of a Soviet-style bomber attack on North America. The decline in that threat led to the Chairman's recommendation that a dedicated continental air defense force was no longer needed. However, the Air Force has proposed to maintain essentially the same framework historically used to defend against a Soviet-style bomber attack.

We are not recommending that all capability to protect U.S. airspace be eliminated. We agree with the Chairman's recommendations to assign the mission to existing Air Force, Navy, and Marine Corps general-purpose and training squadrons and eliminate or sharply reduce the dedicated forces currently associated with continental air defense.

We recognize that the Bottom-Up Review recommended that the Air Force maintain 20 fighter wings for responding to two nearly simultaneous major regional conflicts. However, during peacetime, while most general-purpose forces are not deployed, the air sovereignty mission could be accomplished using general-purpose and training forces. If the most demanding circumstances were to arise and all 20 fighter wings were

needed overseas, over 500 nondeployable training forces could be used, as is now planned, to protect U.S. airspace. This is more than three times the number of aircraft dedicated for that purpose during peacetime. DOD provided no evidence that implementing the recommendation concerning dual tasking general-purpose and training forces would, under the most demanding circumstances, force the National Command Authority to choose between deploying insufficient forces or leaving U.S. airspace unprotected.

## Scope and Methodology

We initiated this review as part of our legislative responsibility and as a result of findings from our ongoing review of the Air Force's fighter support aircraft. We analyzed the air defense mission in regard to current military and nonmilitary threats, the availability and compatibility of other forces to be dual tasked to perform the mission, and the reductions in defense budgets and force structure.

We visited the Office of the Secretary of Defense, Office of the Joint Chiefs of Staff, Air Force Headquarters, Air National Guard Bureau Headquarters, and Defense Intelligence Agency, all in Washington, D.C. Additionally, we visited the North American Aerospace Defense Command, Peterson Air Force Base, Colorado Springs, Colorado; the Air Combat Command Headquarters, Langley Air Force Base, Virginia; the Commander of Naval Air Forces Atlantic, Norfolk, Virginia; the Naval Air Reserves Headquarters, Naval Support Activity, New Orleans, Louisiana; the 1st Air Force Headquarters, NORAD's Southeast Sector Operations Control Center, and Air Defense Forces' F-15 training facilities, Tyndall Air Force Base, Florida; the Air Defense Forces' F-16 training facilities, Kingsley Field, Klamath Falls, Oregon; and the 159th Fighter Group, Naval Air Station, New Orleans, Louisiana.

We also visited the following continental air defense units and alert sites collocated within the units: the 102nd Fighter Interceptor Wing, Otis, Massachusetts; 144th Fighter Interceptor Wing, Fresno, California; 119th Fighter Interceptor Group, Fargo, North Dakota; 125th Fighter Interceptor Group, Jacksonville, Florida; 142nd Fighter Interceptor Group, Portland, Oregon; 148th Fighter Interceptor Group, Duluth, Minnesota; 147th Fighter Interceptor Group, Ellington, Texas; 158th Fighter Interceptor Group, Burlington, Vermont; 177th Fighter Interceptor Group, Atlantic City, New Jersey; and 120th Fighter Interceptor Group, Great Falls, Montana.

While NORAD is a joint U.S.-Canadian command, we limited our review to U.S. air defense forces only.

We conducted our review from June 1992 to July 1993 in accordance with generally accepted government auditing standards.

We are sending copies of this report to the Secretaries of Defense and the Air Force, the Director of the Office of Management and Budget, and other appropriate congressional committees. We will also make copies available to other interested parties on request.

Please contact me at (202) 512-3504 if you or your staff have any questions concerning this report. Major contributors to this report are listed in appendix IV.

Richard Davis

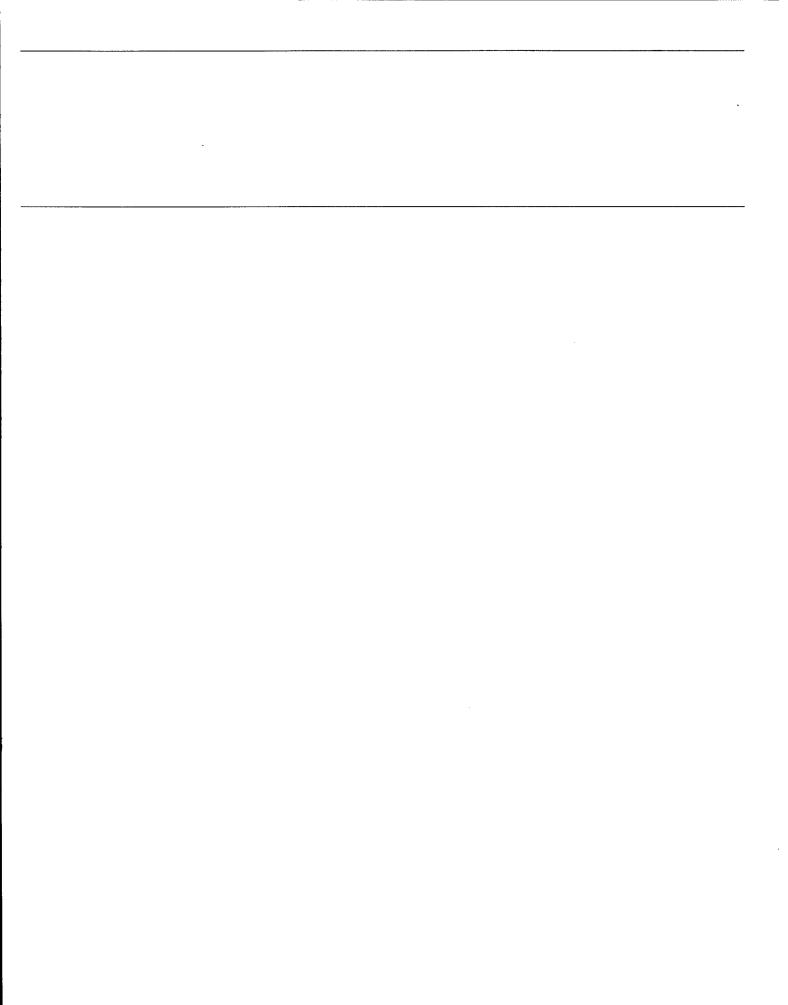
Director, National Security

Richard Davis

**Analysis** 

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# The Continental Air Defense Mission's Transition to the Post-Cold War Environment

The protection of continental skies is the responsibility of the North American Aerospace Defense Command (NORAD), which is comprised of U.S. and Canadian air forces. NORAD's mission of continental protection involves controlling sovereign airspace, assessing and warning of enemy air or missile attack, and intercepting or engaging such threats. This mission is supported by an extensive network of ground-, air-, and space-based radars, sensors, and satellites, as well as up-to-date threat intelligence. NORAD maintains a core force of air defense fighter squadrons to provide protection in the event of an attack. A number of these interceptors are on 24-hour alert at locations along the U.S. border to identify and intercept unknown aircraft or objects. In addition, two alert sites are located in Alaska. The aircraft at these sites are provided by the 3rd Fighter Wing, a dual-tasked active air force F-15 unit stationed at Elmendorf Air Force Base, Alaska.

The continental air defense mission, with its dedicated force, evolved as a direct result of the growth of the Soviet long-range bomber fleet in the post-World War II environment and the detonation of a Soviet atomic bomb in 1949. NORAD was established in 1957 by Canada and the United States to intercept any Soviet long-range bombers attacking over the North Pole. Canada and the United States also built three radar networks across the continent to give 2 to 3 hours warning of bomber attacks. The operation of these extensive networks required daily coordination on tactical matters and considerable merging of plans, so an integrated command was established at Peterson Air Force Base, Colorado Springs, Colorado, to centralize operational control of air defense. By 1960, NORAD maintained approximately 1,200 interceptors dedicated to countering Soviet bombers.

During the 1960s, the character of the military threat changed as the Soviets focused on intercontinental and sea-launched ballistic missiles and developed an anti-satellite capability. In response, the United States built a space-based surveillance and missile-warning system to detect and track airborne threats worldwide. NORAD was given responsibility for this system, thereby adding to its mission the tactical assessment and warning of a possible air, missile, or space attack on North America.

The effectiveness of NORAD's air defense system was first questioned in the early 1960s, when the Soviets shifted reliance from manned bombers to ballistic missiles. The Secretary of Defense at that time believed that current air defenses would limit damage only marginally in a nuclear attack by long-range ballistic and submarine-launched missiles. In his

Appendix I
The Continental Air Defense Mission's
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opinion, the existing interceptor force was excessive in relation to the diminished bomber threat. On the basis of this change in threat and on budget considerations, the Department of Defense (DOD) reduced the number of NORAD interceptors to approximately 300 aircraft by the mid-1970s.

With the breakup of the Soviet Union and the dissolution of the Warsaw Pact in 1991, the military threat upon which NORAD had based its core structure had again changed significantly. Likewise, the Cuban threat was declining, and other military threats did not approach that of the Soviets during the Cold War.

NORAD recognized this drastic reduction in the military threat and determined that sufficient warning time existed to reconstitute forces needed to meet a re-emerging threat of the magnitude of the former Soviet Union. Consequently, NORAD revised the justification for its core forces, emphasizing peacetime air sovereignty. According to a recent NORAD strategy review,

"The dramatically changed threat and . . . development of post-Cold War defense policies suggest real possibilities for shifting NORAD's focus from deterring massive nuclear attack to defending both nations [Canada and the United States] by maintaining air sovereignty . . . . The size of the core force would equate to that required to perform the peacetime Air Sovereignty mission."

NORAD defines air sovereignty as providing surveillance and control of the territorial airspace, which includes:

- intercepting and destroying uncontrollable air objects;
- tracking hijacked aircraft;
- · assisting aircraft in distress;
- · escorting Communist civil aircraft; and
- intercepting suspect aircraft, including counterdrug operations and peacetime military intercepts.

Of these tasks, NORAD considers intercepting drug smugglers the most serious. Under 10 U.S.C. 124, DOD is designated the single lead agency for detecting and monitoring air and maritime shipments of illegal drugs to the United States. DOD gave NORAD the responsibility for intercepting

 $<sup>^1\</sup>mathrm{Drug}$  Control: Impact of DOD's Detection and Monitoring on Cocaine Flow (GAO/NSIAD-91-297, Sept. 19, 1991).

Appendix I The Continental Air Defense Mission's Transition to the Post-Cold War Environment

suspected airborne drug smugglers. However, only 7 percent of NORAD fighter intercepts from 1989-92 were drug related (see table I.1).

NORAD plans to reduce the number of alert sites in the continental United States to 14 and provide 28 aircraft for the day-to-day peacetime air sovereignty mission. Each alert site will have two fighters, and their crews will be on 24-hour duty and ready to scramble within 5 minutes.

Table I.1: Scramble Activity by Air Defense Units a			Scrambles	
Air defense unit/alert site	Status*	Total number	Number drug related	Percent drug related
Atlantic City, N.J.	1	82	14	17.1
Burlington, Vt./	1	6	2	33.3
Langley Air Force Base, Va.	3	52	0	0
Duluth, Minn.	5	0	0	0
Tyndall Air Force Base, Fla.	3	57	6	10.5
Ellington, Tex./	1	158	10	6.3
Holloman Air Force Base, N. Mex.	3	41	5	12.2
Fargo, N. Dak./	5	0	0	0
Kingsley Air Force Base, Oreg.	3	49	0	0
Fresno, Calif./	1	88	1	1.1
Castle Air Force Base, Calif.	4	3	0	0
George Air Force Base, Calif.	4	76	1	1.3
March Air Force Base, Calif.	3	15	0	0
Great Falls, Mont./	4	4	4	100.0
Davis-Monthan Air Force Base, Ariz.	3	62	8	12.9
Jacksonville, Fla./	1,4	64	4	6.3
Homestead Air Force Base, Fla.	. 4	270	24	8.9
Key West, Fla.	3	15	2	13.3
Niagara Falls, N.Y./	5,6	0	0	C
Charleston, S.C.	4	40	1	2.5
Otis, Mass./	1	70	7	10.0
Bangor, Maine	3	32	1	3.1
Loring Air Force Base, Maine	4	22	5	22.7
New Orleans, La.	2	84	7	8.3
Portland, Oreg./	1	33	2	6.1
McChord Air Force Base, Wash.	4	32	0	C
Selfridge, Mich./	5,6	0	0	C
Seymour Johnson Air Force Base, N.C.	3	52	2	3.9
Elmendorf Air Force Base, Alaska	2	111	0	C
Total		1,518	106	7.0

Note: Percents have been rounded.

<sup>&</sup>lt;sup>a</sup>1, Dedicated air defense unit with home station alert site; 2, dual-tasked unit; 3, detached alert site; 4, alert site closed or planned to close; 5, no home alert; 6, changing missions.

## Locations of Air Defense, General-Purpose, and Training Forces

	Dadia da da in		0
State	Dedicated air defense unit	Alert site	General-purpose or training unit
Alabama			X
Alaska		X	X
Arizona		X	X
Arkansas			X
California	Х	X	X
Colorado			X
Florida	Х	X	X
Georgia			X
Hawaii			X
Idaho			X
Illinois			X
Indiana			X
lowa			X
Kansas			X
Louisiana		X	X
Maine		X	
Maryland			X
Massachusetts	Х	X	
Michigan			X
Minnesota	X		
Missouri			X
Montana	X		
Nevada			X
New Jersey	Х		
New Mexico		Х	X
New York			X
North Carolina		X	X
North Dakota	X		
Ohio			X
Oklahoma			X
Oregon	X	X	
South Carolina			X
South Dakota			X
Texas	X	X	X
Utah		· · · · · · · · · · · · · · · · · · ·	X
Vermont	X		West Control of the C
Virginia		Х	X
Annahar shirt and the shirt with a shirt and a shirt a			(continued)

Appendix II Locations of Air Defense, General-Purpose, and Training Forces

State	Dedicated air defense unit	Alert site	General-purpose or training unit
Washington		X	_
Wisconsin			X

Note: California and Oregon each have two alert sites.

## Comments From the Department of Defense





3 FEB 1994

Mr. Frank C. Conahan Assistant Comptroller General National Security and International Affairs Division U.S. General Accounting Office Washington, DC 20548

Dear Mr. Conahan:

This is the Department of Defense (DoD) response to the General Accounting Office (GAO) draft report, "CONTINENTAL AIR DEFENSE: A Dedicated Force is No Longer Needed," dated December 23, 1993 (GAO Code 701011), OSD Case 9592-X. The DoD partially concurs with the report but nonconcurs with the recommendations that would direct the Air Force to eliminate the dedicated air defense force or to reassign the air defense mission to general purpose and training units.

Air sovereignty and the capability for a regenerated continental air defense remain critical functions of the United States Air Force. Recognizing the declining threat of a direct attack on the United States, the DoD has taken measures to size available forces appropriately for air sovereignty of the United States.

The defense strategy articulated in the DoD Bottom-Up Review requires the Air Force to maintain forces sufficient to respond to two nearly simultaneous major regional conflicts. The Bottom-Up Review determined that 20 general purpose Air Force fighter wings are necessary to meet that requirement. The force requirements for air sovereignty are separate from those for major regional conflicts.

The current Air Force plan reduces air defense forces, while maintaining the capability necessary to implement DoD strategy. The Department, however, will continue to evaluate the forces necessary to carry out the air sovereignty mission and make any adjustments appropriate to implement the defense strategy.

The detailed DoD comments on the draft report findings and recommendations are provided in the enclosure. Suggested technical changes were provided separately to the GAO staff. The DoD appreciates the opportunity to comment on the GAO draft report.

Sincerely,

Edward L. Warner III

Shrond L. James

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WELSELED THE MEMORIES

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#### GAO DRAFT REPORT - DATED DECEMBER 23, 1993 (GAO CODE 701011) OSD CASE 9592

CLEARED FOR OPEN PUBLICATION

"CONTINENTAL AIR DEFENSE: A DEDICATED FORCE IS NO LONGER NEEDED"

FEB 2 2 1994 21

DEPARTMENT OF DEFENSE COMMENTS

CRECTOPATE #: 39 FREEDOM OF INFORMATION AND SECLEDITY TEMESTY (OASD PA) DEPART: ENT OF DEFENSE

#### FINDINGS

- (U) FINDING A: The Continental Air Defense Mission Has Changed Since Establishment in 1957. The GAO observed that the continental air defense mission evolved during the Cold War to detect and intercept Soviet bombers attacking North America via the North Pole. The GAO further observed that the dedicated force, which is within the North American Aerospace Defense Command, is currently comprised of 180 Air National Guard F-15A and F-16A aircraft located in ten units and 14 alert sites in the United States. In addition, the GAO noted that there are two F-15 dual-tasked general purpose units that stand alert for the Command--an active unit at Anchorage, Alaska, and an Air National Guard unit at New Orleans, Louisiana. The GAO explained that, because the dedicated force does not have a wartime mission outside North America, it is not counted as part of the Air Force 26-1/2 fighter wing equivalent base force--or as part of the 20 fighter wing equivalent force recently proposed by the Secretary of Defense as a result of the Bottom-Up Review. The GAO reported that the Air Force currently budgets about \$340 million annually to operate and support the continental air defense force.
  - (U) The GAO found that, in February 1993, the Chairman of the Joint Chiefs of Staff recommended the continental air defense mission be performed by dual tasking existing Active and Reserve general purpose fighter and training squadrons in the Air Force, the Navy, and the Marine Corps--and that the number of Air National Guard units dedicated to that mission be sharply reduced or eliminated. The GAO observed that the Chairman had determined the U.S. no longer needed a large, dedicated air defense force because of the near disappearance of the Soviet threat-and, therefore, recommended the changes to achieve maximum effectiveness of the Military Services. The GAO also observed that the Secretary of Defense viewed the Chairman's recommendations as a top priority and directed the Air Force to reduce the force--but retain the mission primarily as an Air Force Reserve responsibility. In response, the GAO found that the Air Force devised a plan to retain the mission within the Air National Guard as a dedicated force, and reduce that force from 180 aircraft to slightly more than two fighter wing equivalents; thus accomplishing only

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a portion of what was envisioned by the Chairman. The GAO also noted that the plan had not yet been approved. (pp. 1-3, pp. 14-17/GAO Draft Report)

- (U) <u>DOD RESPONSE</u>: Partially concur. The DoD agrees that the Chairman of the Joint Chiefs of Staff's Roles, Missions and Functions Report of February 1993 recommended elimination or sharp reductions in the dedicated forces associated with continental air defense. Since that time, however, the underlying assumptions for that analysis have changed. The Roles and Missions Report analysis was based on an Air Force of 26 1/2 fighter wings. Subsequent force structure reductions have reduced the Air Force to 20 fighter wings of general purpose forces.
- (U) The Air Force has significantly reduced its dedicated continental air defense forces. Throughout the last three decades, the Air Force has continued to size the continental air defense force to match capabilities against the threat. Nearly 1,100 fighters were dedicated to the defense of North America in the 1960s. Even since 1985, when the force structure included nearly 300 fighters and 26 continental United States alert locations, the Air Force has reduced its forces and alert sites by nearly 50 percent. The framework for the 1993 recommendation from the Chairman of the Joint Chiefs of Staff was 216 dedicated continental air defense fighters; the subsequent Air Force plan to reduce that force to slightly more than two fighter wing equivalents represents a significant reduction from the levels considered in the Chairman of the Joint Chiefs of Staff review.
- (U) Recent force structure reductions have also changed the circumstances associated with the two general purpose units which conduct alert. The 159 Fighter Group at New Orleans will no longer stand alert for continental air defense. The squadron assigned to North American Aerospace Defense Command in Alaska does not have worldwide deployability. While counted as a general purpose unit, the squadron is not tasked for missions other than the defense of North America.
- (U) FINDING B: The Threat of a Soviet-style Attack Has Diminished. The GAO concluded that, inasmuch as the Soviet threat had largely disappeared, the U.S. no longer needed such a large dedicated continental air defense force. The GAO observed that the air defense force had refocused its activity on the air sovereignty mission—concentrating on intercepting drug smugglers. The GAO found, however, that anti-drug smuggling activities at some alert sites have been minimal and at others almost nonexistent. The GAO noted that, during the past 4 years, North American Aerospace Defense Command alert fighters took off to intercept (scrambled) 1,518 times, or an average of 15 times per site per year. The

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GAO also observed that, of those incidents, flights against suspected drug smugglers averaged one per site, or less than 7 percent of the total activity at the alert sites. (pp. 4-5/GAO Draft Report)

(U) DOD RESPONSE: Partially concur. The DoD agrees that the nature of the threat has changed. However, air sovereignty has always been a part of the mission of air defense forces. During the Cold War, air sovereignty was imbedded in the mission of continental air defense. Now, with a reduced threat, the resized force continues the essential mission of air sovereignty: "A nation's inherent right to exercise absolute control and authority over the airspace above its territory." This mission includes detection, identification, and monitoring of air traffic which is approaching or entering the sovereign airspace of the United States. Conducting the air sovereignty mission protects the United States from inadvertent or intentional airspace violations which include not only the possibility of an armed attack from another sovereign nation, but also terrorist activities, and illegal activities (such as illegal immigration, smuggling, and illicit drug activities). The air sovereignty mission is not driven so much by threat, but rather by the geographic area that must be protected. The Commander-in-Chief of the North American Aerospace Defense Command established the requirement for 14 alert sites to meet this geographic requirement. The GAO finding implies that a lack of activity at a site means that little is being accomplished. However, the deterrent nature of maintaining the capabilities to provide for air sovereignty should also be considered. The presence of a force capable of intercepting airborne traffic can have the effect of deterring illegal activity

(U) FINDING C: Reserve and Active Units Have Comparable or Better Aircraft and Could Carry out the Air Defense Mission. The GAO observed that air defense F-16 aircraft had been modified for the air sovereignty mission-and that the modifications included enhancements of armament, communications, target detection and identification. The GAO noted, however, that general-purpose combat and training forces aircraft, such as the F-15C, the F-16C, the F-14A/C, and the F-18A/B/C, were also capable of performing the air defense and air sovereignty missions. The GAO pointed out that those aircraft are generally newer and equipped with more advanced avionics than the dedicated air defense force F-16As and F-15As--which are the oldest F-16 and F-15 models in the Air Force inventory. For example, the GAO found that the more modern F-16Cs and F-15Cs have advanced radars that provide greater range and sharper resolution than those on the F-16A or F-15A, and that the F-15C had undergone a multistage improvement program to enhance other avionics--such as the electronic countermeasure system and the central computer system.

are located at about 50 bases dispersed throughout the United States, and could support the Aerospace Defense Command coverage requirements. In addition, the GAO observed that several air defense force alert sites are collocated with or close to general purpose and training units. Although acknowledging that some general purpose and training forces might have to deploy to other locations, the GAO concluded that existing dual-tasked Now on pp. 4-5. general purpose and training forces would be able to fulfill the air defense and air sovereignty missions. (pp. 6-8/GAO Draft Report)

> (U) DOD RESPONSE: Partially concur. While the aircraft flown by the general purpose forces are capable of conducting the air sovereignty and air defense mission, the report fails to recognize that those forces will not necessarily be located in the United States. The fundamental requirement of the general purpose force structure is to provide overseas presence and to project power in the event of major regional conflict. The DoD Bottom-Up Review established a requirement for 20 general purpose fighter wings to respond to two nearly simultaneous major regional conflicts. Yet, if such conflicts were to occur, that would likely be coincident with concerns about threats to the continental United States. If the general purpose and training forces were dual tasked, the National Command Authority would ultimately be in the position of either failing to respond fully to two major regional conflicts, as the strategy requires, or leave the United States without any capability to protect its airspace.

(U) The GAO also observed that current air defense and alert sites are located along the U.S. borders to provide geographic coverage; however, the general purpose and training units in the Active and Reserve forces

(U) The report also implies that by drawing on the capabilities of the general purpose forces, the U.S. would be afforded better defense because the aircraft are newer. The DoD recognizes the need for modernized aircraft to conduct the demanding mission of air sovereignty and air defense and has accordingly developed a plan to modernize the fleet. Making use of aircraft freed-up by force reductions, the air defense forces will operate newer F-16As and F-16Cs. The F-15A fleet in the air defense forces has already been programmed to receive upgrades to make its avionics equivalent with the general purpose F-15 fleet.

(U) The GAO conclusion that Navy and Marine Corps general purpose aircraft could conduct the air defense mission fails to account for the fact that those forces are fully committed to other missions, particularly at reduced force levels.

(U) FINDING D: Skills for the Air Defense Mission Are Comparable to Other Combat-Type Active and Reserve Missions. The GAO concluded that pilot skills required for the air defense mission are, in several ways,

comparable or similar enough to allow for dual tasking of general purpose units. For example, the GAO observed that general purpose and air defense pilots are required to be proficient in (I) day or night target intercepts, (2) defending an area, (3) aerial gunnery, and (4) quick takeoffs or scrambles. The GAO also observed that some pilot skills are unique to either general purpose units or air defense units. For example, the GAO indicated that skills, such as those needed for composite force training and joint maritime operations, are needed by general purpose units, but are not necessary for all air defense force pilots. Likewise, the GAO indicated that skills unique to air defense and air sovereignty pilots, such as slow shadow—day or night visual identification—are needed so that the pilots can identify and track unknown aircraft, but are not needed by general purpose units. The GAO concluded that, even though the different missions have some unique pilot requirements, enough training similarities would allow general purpose squadrons to accomplish the air defense and air sovereignty missions. (p. 9/GAO Draft Report)

(U) <u>DOD RESPONSE</u>: Partially concur. The DoD agrees that the pilot skills for the air defense mission and general purpose missions are similar. The GAO implies, however, that there would not be any detriment to adding the air defense tasking to general purpose units. That view fails to recognize that general purpose units are already heavily tasked for airborne missions. Adding additional responsibilities would (1) demand an increase in operations tempo to account for additional training, and (2) potentially dilute the combat capability of the tasked units by adding air defense training at the cost of decreasing training for another mission. For example, the night vision goggle capability of the air defense fleet currently demands an academic program and 3 sorties per pilot for initial qualification, as well as 12 sorties annually to maintain minimum currency.

(U) FINDING E: The Cost to Maintain a Dedicated Air Defense Force Is Significant. The GAO concluded that the recommendations by the Chairman of the Joint Chiefs of Staff could result in significant cost savings. For example, the GAO indicated that if existing general-purpose and training forces were tasked to accomplish the air defense and air sovereignty missions, force structure and associated costs could be reduced. The GAO concluded that the amount of savings depended on whether the dedicated air defense units were disbanded or assigned another mission; however, if all the air defense units were to be disbanded, the Air Force could save as much as \$340 million in annual operation, maintenance, and personnel costs.

The GAO acknowledged that existing Active and Reserve units may need additional resources, such as aircraft for alert duties, to accomplish the

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added responsibility. The GAO maintained, however, that the cost associated with those aircraft could be offset if a corresponding dedicated air defense unit were disbanded, as the Chairman suggested. For example, the GAO explained that the dual tasked F-15 general purpose unit at the New Orleans Naval Air Station had 24 combat aircraft instead of the usual 18 aircraft assigned to F-15 units that are not dual tasked. The GAO observed that those aircraft cost about \$46 million annually, or about \$6 million more than the units with 18 aircraft. The GAO concluded that, if dual tasking a 24-combat aircraft Air National Guard unit would eliminate a dedicated air defense F-15 unit costing about \$42 million, then about \$36 million would be saved. (pp. 9-10/GAO Draft Report)

- (U) <u>DOD RESPONSE</u>: Partially concur. The DoD agrees that complete elimination of all dedicated air defense units would save a significant amount of money. However, as discussed previously, the hidden cost would be the loss of combat capability of the general purpose forces and the loss of flexibility for the National Command Authority. Under the most demanding of circumstances, a choice would be required between defense of the continental United States and responding fully to two nearly simultaneous major regional conflicts.
- (U) The GAO proposal to increase general purpose units by six primary assigned aircraft does not fully capture all the associated costs. To fully man ten alert sites with additional primary assigned aircraft in existing units would, at a minimum, cost an additional \$127 million annually. Furthermore, the proposal implies that if the general purpose unit needed to deploy, the extra primary assigned aircraft and pilots would remain behind to continue air sovereignty and air defense functions. That concept of operations would be extremely demanding and would require an increase in infrastructure and support (currently programmed support forces would deploy with their units), driving costs even higher.
- (U) FINDING F: The Air Force Plan Would Not Achieve Significant Cost Savings. The GAO concluded that, because the Secretary of Defense guidance and the Air Force plan would retain the air defense mission as a dedicated Air National Guard responsibility and only reduce that force structure, significant cost savings would not be achieved. The GAO asserted that the Air Force plan to reduce the dedicated force slightly by retiring three aircraft at each of the ten Air National Guard units would save about \$36 million annually in operations and support costs. The GAO concluded, therefore, that the Air Force would not realize significant savings in personnel and operating and support costs under the current plan, since the Air Force would continue to incur the associated operating and maintenance costs for all 10 dedicated air defense units. The GAO

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again pointed out that the Air Force plan had not yet been approved by the Secretary of Defense. (pp. 10-11/GAO Draft Report)

(U) DOD RESPONSE: Partially concur. The DoD acknowledges that additional resources will be required to keep the air defense units open. However, retention of all 10 air defense units is the most prudent course at the present time. The nation pays a relatively low price to preserve air sovereignty and a modest air defense capability that could be rebuilt if circumstances were to so require.

#### RECOMMENDATIONS

(U) <u>RECOMMENDATION 1</u>: The GAO recommended that the Secretary
of Defense not approve the Air Force plan unless it is modified to
eliminate or sharply reduce the dedicated air defense force. (p. 11/GAO
Draft Report)

(U) <u>DOD RESPONSE</u>: Nonconcur. As discussed in the DoD response to Findings A and C, the underlying assumptions included in the February 1993 report by the Chairman of the Joint Chiefs of Staff have changed. The more recent DoD Bottom-Up Review established a requirement for 20 general purpose Air Force fighter wings to respond to two nearly simultaneous major regional conflicts. The force requirements for air sovereignty are separate from those for major regional conflicts.

(U) The current Air Force plan has been structured to appropriately reduce the overall air defense force, while maintaining the capability necessary to implement the defense strategy. Accordingly, the DoD FY 1995 budget request will implement the proposed Air Force reductions in continental air defenses. There remains the possibility, however, that the plan may be modified as the Department develops its FY 1996-2001 Future Years Defense Program later this year.

(U) <u>RECOMMENDATION 2</u>: The GAO recommended that the Secretary
of Defense not approve the Air Force plan unless it is modified to reassign
the air defense mission to Active and Reserve general purpose and
training units. (p. 11/ GAO Draft Report)

(U) <u>DOD RESPONSE</u>: Nonconcur. As discussed in the DoD responses to Findings C, D, and E, reassigning the air sovereignty and continental air defense mission to general purpose forces could jeopardize the ability of the general purpose forces to meet DoD strategy requirements. The strategy requires that general purpose forces be capable of responding to

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two nearly simultaneous major regional conflicts. In addition to laying additional training requirements on fully tasked units, dual tasking the general purpose forces could, under the most demanding circumstances, force the National Command Authority to choose between deploying insufficient forces to meet contingency requirements or facing a serious shortfall in forces capable of protecting American airspace.

## Major Contributors to This Report

National Security and International Affairs Division, Washington, D.C. Jerry Herley, Assistant Director

Norfolk Regional Office Richard G. Payne, Regional Management Representative Frank R. Marsh, Evaluator-in-Charge Carolyn L. McClary, Evaluator Jeffrey C. McDowell, Evaluator